National Institute of Child Health and Human Development Workforce Plan: FY 2002-2003

- 1. NICHD hiring plans have been specifically targeted to develop, implement, and support the mission of the Institute and the research goals of our intramural and extramural programs. Our recruitment efforts are designed to attract and retain individuals with the knowledge and skills necessary to capitalize upon emerging scientific and technological advances that will lead to improving the health of mothers and their children. Within our Division of Intramural Research, research initiatives concern the biological, clinical and behavioral aspects of normal and abnormal human development. Research emphasis is on the cellular and molecular developmental mechanisms and interactions that guide a single fertilized egg through its development into a multicellular, highly organized and specialized adult organism. Within our Extramural Centers, NICHD supported research is being conducted to advance fundamental and clinical knowledge concerning such problems as: low birth weight; mental retardation and developmental and learning disabilities; congenital and genetic defects; growth retardation; SIDS; HIV; infertility; contraceptive development; the population sciences; and enhancing the functioning of people with disabilities in their daily lives. Our recruitment and staff retention efforts focus on advancing these research areas. Scientific staff that we will recruit in the years ahead will need to have expertise in the disciplines most relevant to our research programs: pediatric infectious disease, autism and mental retardation, obstetrics and gynecology, developmental biology, developmental psychology, human subject research, disease prevention in minority populations, and career development of minority researchers. To support our research efforts, we will also need to recruit individuals with highly technical laboratory skills (e.g. gene splicing and micro-array, bioimaging, biostatistics) and an array of management and administrative skills--particularly in the areas of information technology, grants, contracts, and procurement--to assure that our programs and our resources are managed effectively and efficiently; and that information is disseminated, organized and quality controlled to facilitate health care improvements and further research.
- 2. The establishment of new, high priority research initiatives will have a direct impact upon our human resource efforts in recruiting and retaining highly qualified staff and in managing our resources to attain our research goals. We anticipate an expanded skill set consistent with new technology to augment existing skills, with limited to no reduction in the variety of skills that currently exist. NICHD's Strategic Plan (http://www.nichd.nih.gov/strategicplan/cells)--developed to chart our research activities over the next 3 to 5 years--has defined seven broad areas of research that are critical to our mission, that represent topics in which significant gaps in knowledge remain, that capitalize upon emerging scientific and technological advances, and that represent important public health concerns. The topical areas include: developmental biology to understand normal and abnormal human development; management of fertility and improving reproductive health; genetics of susceptibility to disease and disorders; health disparities in minority populations; preventing adverse maternal-fetal events; preventing AIDS/HIV and adverse consequences of HIV therapy; and disability prevention and intervention. In addition, the President's interests in early childhood development, learning, and literacy will translate into

expanded research efforts (and associated recruitment and retention needs) to determine effective methods of reading instruction for children in kindergarten to grade three, the best early predictors of reading difficulty, and the most effective approaches to early childhood preparation so that our nation's preschoolers enter kindergarten ready to learn. Additionally, expanded efforts are required to bring research findings to practical application. For example, data has shown a dramatic reduction in the rate of SIDS as a result of changing to back sleep position. However, the reduction is not as great in the African American community, pointing to a need to develop communication strategies aimed at reducing the SIDS disparity that exists. Recruitment of staff to manage our SIDS education program, and to enhance our program in the African American community, results from this priority initiative. The Congressionally mandated National Longitudinal Birth Cohort Study of Environmental Influences on Childrens' Health, for which NICHD has lead responsibility, and the expansion of AIDS research internationally will both require increased scientific personnel and contract staff. The impact of additional levels of funding for these and other programs creates a pressing need to recruit and retain staff with expertise in cutting-edge scientific disciplines associated with our programs as well as in grants management, R&D contracts, information technology and scientific review functions, so that our research funds can be targeted effectively and managed efficiently through partnerships with universities, industry, public and private foundations, etc. In addition to the recruitment of new scientific and professional staff, the human resource and workforce management implications of our research activities is significant and has included branch level reorganizations and consolidations within our Intramural Research Program to more effectively focus scientific and clinical research activities; similar ongoing organizational restructuring in our grants, contracts and information technology functions are ongoing in order to reduce overhead costs and increase efficiencies; expanded use of the Title 42 hiring authority to recruit and retain top scientific staff and to provide management with greater flexibilities when research initiatives change or need to be re-directed; extensive use of the contracting mechanism to support the clinical research activities of our Perinatology Research Branch in response to a Congressional mandate for increased research in this area; and continuous process re-engineering to enable a flexible organizational structure to capitalize on unpredictable research advances.

3. The changing demographics of the workforce and the competition to recruit and retain top performing individuals to meet our research goals have required us to employ creative and flexible human resource management tools. We have utilized virtually all recruitment authorities and compensation flexibilities available to us--Title-42, above the minimum rate pay setting, recruitment bonuses and retention allowances, loan repayments, outstanding scholar recruitment, and use of flexible workplace and scheduling--to help insure our ability to attract and retain staff. With regard to use of Title-42, we have developed evaluation criteria and a pay band structure that helps us recruit and retain our best scientists, while enabling us to maintain effective control of compensation levels. Within NICHD, the use of telecommuting is beginning to grow--helping employees to balance their work and personal lives more effectively. In two recent instances, we have approved telecommuting work arrangements to accommodate employees with seriously debilitating health conditions. The arrangements have enabled the employees to continue their work activities in home environments more conducive to their health needs. Use of Title 42 has enabled us to keep two premier scientists from leaving to join "dot-com" and genetics research firms willing to pay more and offer greater long-term benefits.

- 4. Within the NICHD, we are careful to ensure that our human resources are focused in areas of scientific priority, or are utilized in direct support of our research programs. We have instituted a workforce planning process for the review of resources under which the financial expenditures and human resource needs of our programs are assessed quarterly. This enables us to ensure that resources are being expended appropriately and efficiently, to reduce overhead costs, to adjust resources to changing priorities, and to plan for upcoming vacancies. Likewise, all position vacancies in non-scientific areas are reviewed by the Associate Director for Administration to determine their need prior to recruitment activity being initiated. These efforts have helped us to be certain that our resources are focused on our research priorities and are available to meet our staffing needs. As a result, our recruitment efforts are heavily focused on non-supervisory research staff. (For 2001, only 4 out of 190 continuing recruitment positions are supervisory in nature. This will result in a decline in our current average supervisory ratio of 1:37.) Additionally, through our continuing workforce planning discussions, we have been able to identify mid and junior level staff who have demonstrated the potential to assume additional responsibilities or positions of leadership, insuring smooth succession and knowledge management. We have nurtured these individuals through developmental work assignments, formal training, and participation in NIH-wide developmental programs. Our workforce planning processes to identify future staffing needs, combined with the creative use of available staffing and compensation mechanisms and the continuing identification and development of our staff will help us meet our future staffing needs.
- 5. In recent years, as recruitment and compensation authorities were delegated to the NIH and to the I/Cs, our ability to recruit and retain top level scientific staff to meet important research needs was greatly enhanced. Our authorities enabled us recruit and retain staff, with minimal time delays, who heretofore could not be compensated at acceptable levels under the GS system. Any movement to re-centralize senior level appointment authorities and to reduce the authority of I/C Directors to set compensation levels, will inhibit our previous success and our ability to recruit and retain our top scientists will be compromised. In addition, we believe that the recruitment and hiring process needs to be modernized and streamlined. Vacancy announcements that can exceed four pages in length; cumbersome requirements for candidates to complete narrative descriptions of their background; lengthy and subjective review, evaluation and certification procedures, all combine to dissuade candidates from applying for Federal positions and from filling vacant positions in a reasonable time frame. Despite efforts to improve the process, a better recruitment and hiring system is needed that will encourage individuals to apply for our vacancies and that will enable us to fill those positions more quickly. Finally, authority to contract for long and short term shortages in clerical, technical and general support positions will enhance our ability to cope with any rapid brain drain due to retirements or unforseen catastrophes (e.g. shortages of nurses, information technology professionals, etc).
- 6. In managing our fiscal and human resources, NICHD has delegated budget, purchasing and human resource authorities to the lowest levels in the organization consistent with sound decision making and proper stewardship of government funds. All of our staff and managers are within a telephone call or e-mail message away from the customers they serve, both external and internal. We believe that our delegation and approval levels are currently maximized--allowing our line managers to make decisions on matters affecting the operations of their programs, yet providing

us with balanced oversight of the use of our resources. We have encouraged an atmosphere of quality customer service and open communication with our employees and the public--utilizing our websites, our public communication and liaison programs, and our community outreach activities to communicate with our constituents face to face and to quickly provide educational materials to the public on our research activities and findings. (Examples include our Milk Matters and SIDS public education campaigns). We will continue to look for additional opportunities to de-layer over time.

7. Effective workforce restructuring entails both the ability to recruit individuals to meet future staffing needs and the movement of workers from programs of lower priority to those of greater importance. Mid and junior level staff who must be reassigned may require the NIH to invest to different degrees in their training for other positions. Staff nearing retirement age for whom retraining is not practical, should be allowed to end their careers through buyout and early retirement authority. Targeted buyouts and voluntary early retirement would be a useful way to eliminate positions in lower priority areas, and would generate additional slots for use in areas of higher program priority. Using Title-42, A-76 and other management tools, we are planning greater flexibility for the future already. Increased flexibility and "safe landing" for performance issues are also desirable. Incentives could also be improved for SES mobility.

NICHD Hiring Plans for FYs 2002/2003			
	FY 2002	FY 2003	Total
INTRAMURAL			
Senior Investigators ¹	0	3	3
Investigators ¹	13	20	33
Other MD/PhDs, in FTE positions	39	49	88
Other MD/PhDs in non-FTE positions (IRTA, VF)	126	161	287
Other lab/clinical staff => GS-13	6	15	21
Other lab/clinical staff =< GS-12	23	38	61
Admin/support staff => GS-13	1	2	3
Admin/support staff =< GS-12	13	17	30
Infrastructure support => GS-13		-	0
Infrastructure support =< GS-12 ²		-	0
Summer and other temps not listed above (include summer IRTAs)	150	150	300
TOTAL INTRAMURAL	371	455	826
EXTRAMURAL			
HSAs/SRAs and other senior level science administrators => GS-13	15	2	17
Other science administration positions =< GS-12	1	1	2
Grants Management and R&D Contract Staff => GS-13 ³			0
Grants Management and R&D Contract Staff =< GS-12 3	7	8	15
Administrative and support staff => GS-13	4	1	5
Administrative and support staff =< GS-12	14	19	33
Infrastructure support => GS-13		-	0
Infrastructure support =< GS-12 ²		-	0
Summer and other temps not listed above	8	8	16
TOTAL EXTRAMURAL	49	39	88
IC TOTAL	420	494	914
¹ Using OIR professional designations			
² Include all wage grade positions related to infrastructure in this group			